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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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Mark W.L. Smith

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23589

7590

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EXAMINER

PHAM, HUONG Q

ART UNIT

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**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

<b>Office Action Summary</b>	<b>Application No.</b> 10/707,930	<b>Applicant(s)</b> SMITH ET AL.	
	<b>Examiner</b> HUONG Q. PHAM	<b>Art Unit</b> 3772	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 18 September 2007.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-36 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-36 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 18 September 2007 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \*    c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)          | 4) <input type="checkbox"/> Interview Summary (PTO-413)           |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____                                      |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)          | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____  | 6) <input type="checkbox"/> Other: _____                          |

## **DETAILED ACTION**

### ***Continued Examination Under 37 CFR 1.114***

A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114.

Applicant's submission filed on 9/18/2007 has been entered.

### ***Specification***

The amendment filed on 9/18/2007 is objected to under 35 U.S.C. 132(a) because it introduces new matter into the disclosure. 35 U.S.C. 132(a) states that no amendment shall introduce new matter into the disclosure of the invention.

The added material which is not supported by the original disclosure is as follows: “a lower most constricted margin 82.

The original disclosure does not mention the “lower most constricted margin 82”, and it is unclear what structures are included in this phrase “lower most constricted margin 82”.

Note that the original specification indicates reference 22 in figure 1 as “distal end”.

**Applicant is required to cancel the new matter in the reply to this Office Action.**

### ***Drawings***

The drawings were received on 9/18/2007.

These drawings are objected to, because of the added reference number 82 in figure 1.

Art Unit: 3772

As discussed above , the added phrase “ lowermost constricted margin 82” introduces new matter into the original disclosure.

It is unclear what structures are included in this phrase “lower most constricted margin 82”. Note that the original specification indicates reference 22 in figure 1 as “ distal end”.

### **Claim Rejections - 35 USC § 112**

**The following is a quotation of the second paragraph of 35 U.S.C. 112:**

**The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.**

Claims 1 and 22 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

It is unclear what structure are included in the phrase “lowermost constricted margin” (note that the original specification indicates reference 22 in figure 1 as “ distal end” ) .

### **Claim Rejections - 35 USC § 103**

**The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:**

**(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.**

Art Unit: 3772

Claims 1- 7 and 14 -21 are rejected under 35 U.S.C. 103(a) as being unpatentable over Crowell et al ( 3,138,156) in view of Garber et al ( 3,449,766) and/or Graber ( 3,237,210) .

As for claim 1, Crowell et al teaches an above knee shrinker for applying therapeutic compression to a wearer's leg residual limb, said above knee shrinker comprising a waist belt 13 ( figure 2) dimensioned for snugly receiving the waist of the wearer; a tubular fabric receptacle 11 dimensioned and configured to be worn on the residual limb and apply a compressive force to the residual limb when the shrinker is donned, said receptacle presenting top and bottom ends and being open adjacent each of the ends so that the residual limb can be inserted into the receptacle adjacent the top end, said receptacle being coupled to the waist belt adjacent the top end so that snug securement of the waist belt 13 about the wearer's waist restricts vertical displacement of the receptacle along the residual limb when the shrinker is donned, said receptacle 11 is capable of being dimensioned so as to be longer than the residual limb, said receptacle including a U-shaped edge projecting from the top end so as to present a U-shaped perineal opening, with said perineal opening being adjacent the torso end of the residual limb when the shrinker is donned, said U-shaped edge including a pair of spaced apart upright sections extending from the top end and a bottom section that is spaced from the top end and interconnects the upright sections; and a constricting element 14, 17 operable to constrict the receptacle 11 and is capable of facilitating doubling over of the receptacle.

Crowell et al does not teach a vertically movable constricting element located at the location as recited in claim 1.

Garber et al teaches a vertically movable elastic constricting element 32 ( figure 6, note that the position of the constricting element can be vertically adjustable ) between a main tubular portion and a double over tubular portion, wherein the doubled over tubular portion is

Art Unit: 3772

capable of being folded over the main tubular portion ( note figures 3 , 4) to cover the constricting element 32 and at least part of the main tubular portion ( figure 3) .

Graber teaches a vertically movable elastic constricting element 8 ( figure 3, the position of the constricting element can be vertically adjustable ) between a main tubular portion and a double over tubular portion, wherein the doubled over tubular portion is capable of being folded over the main tubular portion to cover the constricting element 8 and at least part of the main tubular portion ( figure 3) .

In view of the teaching of Garber et al and/or Graber , it would have been obvious to one ordinary skill in the art at the time the invention was made to modify the constricting element 14, 17 of Crowell et al by providing a vertically movable constricting element , at a location similar to the location of the constricting element 32 of Garber et al and /or similar to the location of the constricting element 8 of Graber, wherein the modified vertically movable constricting element is adapted for receiving and encircling the receptacle 11 , and wherein the vertically movable constricting element being positioned between a main tubular portion and a double over tubular portion, and wherein the doubled over tubular portion is folded over the main tubular portion to cover the constricting element and at least part of the main tubular portion; said constricting element is capable of being vertically moveable along the receptacle 11 of Crowell et al to adjust a length of the doubled over portion of the receptacle.

As for claim 2, note that the top end and the U-shaped edge of the device of Crowell et al cooperatively defining a residual limb opening through which the residual limb is inserted when the shrinker is donned, said perineal opening forming part of the residual limb opening.

As for claim 3, Crowell et al shows in figure 2 that each of the upright sections being generally linear and when the shrinker is donned.

Art Unit: 3772

As for claim 4, Crowell et al shows in figure 2 that the bottom section having an arcuate shape.

As for claim 5, Graber shows in figure 3 that the constricting element 8 operable to constrict the receptacle generally adjacent to the distal end of the tubular member 1.

As for claim 6, Graber shows in figure 3 that the constricting element including a ring 8 received over the receptacle 1, said ring being adapted to engage and bear against the distal end of the tubular member 1.

As for claim 7, Crowell et al teaches that the receptacle 11 is being predominantly formed of multi-directional stretchable material ( column 2, lines 23-30).

As for claim 14, Crowell et al teaches that the receptacle 11 including a belt-receiving channel 23 adjacent the top end, said channel being dimensioned to removably receive the waist belt 13, said waist belt presenting two separate belt ends, and including an adjustable self-fastening mechanism 22.

As for claim 15, the use of hook and loop fastening material adjacent the belt ends is very well-known and well within the realm of one ordinary skill in the art. It would have been obvious to one ordinary skill in the art at the time the invention was made to modify the belt of Crowell et al and provide it with hook and loop fastening material adjacent the belt ends in order to provide an adjustably fastening mechanism.

As for claim 16, Crowley teaches the receptacle 11 being formed by a continuous circular fib-knit construction . The provision for a seamless tubular member is well known and well within the realm of one ordinary skill in the art, and does not provide any unexpected result, and therefore is not patentable over prior art.

Art Unit: 3772

As for claim 17, note that the sleeve member 11 of Crowley et al is made of elastic stretch knitted fabric. The provision for the well-known stitches of a one-by-one rib stitch knitting pattern for a tubular member is well within the realm of one ordinary skill in the art, and does not provide any unexpected result, and therefore is not patentable over prior art.

As for claim 18, the provision for the well-known pattern of knitting in connected loops of substantially uniform pattern and number per square inch throughout the receptacle for a tubular member well within the realm of one ordinary skill in the art, and does not provide any unexpected result, and therefore is not patentable over prior art.

As for claim 19, Crowell et al 's receptacle 11 is a "dyeable" fabric material.

As for claim 20, the provision for a latex free material for a sleeve member is well known and well within the realm of one ordinary skill in the art, and does not provide any unexpected result, and therefore is not patentable over prior art ( for example, note column 8, lines 60-67 of the patent # 6,158,253 to Svoboda et al) .

As for claim 21, the provision for an anti-fraying material for a sleeve member is well known and well within the realm of one ordinary skill in the art, and does not provide any unexpected result, and therefore is not patentable over prior art.

Claims 8-13 and 22 -36 are rejected under 35 U.S.C. 103(a) as being unpatentable over Crowley et al ( 3,138,156) in view of Garber et al ( 3,449,766) and /or Graber ( 3,237,210) , and further in view of Svoboda et al ( 6,158,253).

Note the comments to all the claims above for the teachings of Crowley et al, Garber et al, and Graber .



Art Unit: 3772

As for claim 8 while Crowell et al does not specifically discuss about the elastic stretch knitted fabric of the sleeve 11, Svoboda et al teaches the use of core-spun yarn for a stretchable tubular member.

In view of this teaching of Svoboda et al, it would have been obvious to one ordinary skill in the art at the time invention was made to use core –spun yarn for the member 11 of Crowell et al for the desired stretchability .

The provision for a core –spun yarn for a stretchable tubular member is very well known and well within the realm of one ordinary skill in the art, and does not provide any unexpected result, and therefore is not patentable over prior art.

As for claim 9, the core-spun yarn of Svoboda et al comprising a spandex core and a fiber sheathing.

As for claim 10, note column 7, lines 28-31 of Svoboda et al. It is well within the realm of one ordinary skill in the art to select a well known core-spun yarn material to accommodate for the desired stretchability .

As for claims 11- 13, it is well within the realm of one ordinary skill in the art to select a well known core-spun yarn material to accommodate for the desired stretchability.

As for claims 22- 36, note the comments to all the claims above for the teachings of Crowell et al, Garber et al, Graber, and Svoboda et al. Similarly, as discussed above, the combination teachings of Crowell et al, Garber et al, Graber, and Svoboda et al teach all the structure recited in claims 22-36.

### ***Response to Arguments***

Applicant's arguments filed on 9/18/2007 have been fully considered but they are moot in view of the new grounds of rejection.

Art Unit: 3772

Note the comments relative to all the claims above.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to HUONG Q. PHAM whose telephone number is (571)272-4980. The examiner can normally be reached on M-W, 9:30AM-6:00PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Patricia Bianco can be reached on ( 571) 272 - 4940. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Huong Pham/  
April 8, 2008

/Patricia Bianco/  
Supervisory Patent Examiner, Art Unit 3772